

U.S. DEPARTMENT OF HOUSING AND URBAN DEVELOPMENT
ASSISTANT SECRETARY FOR HOUSING-FEDERAL HOUSING COMMISSIONER

Series and Series Number: (Supersedes
issue dated September 28, 1992)

TO: DIRECTORS, HOUSING DIVISION
DIRECTORS, MULTIFAMILY DIVISION
DIRECTORS, SINGLE FAMILY DIVISION

MATERIALS RELEASE NO. 1254a

ISSUE DATE: June 6, 1996

REVIEW DATE: June 6, 1999

SUBJECT: 1. Product Ultrakote One Coat Stucco
2. Name and Address Ultrakote Products, Inc.
of Manufacturer 327 South 27th Avenue
Phoenix, AZ 85009

Data on the nonstandard product described herein have been reviewed by the Department of Housing and Urban Development and determination has been made that it is considered suitable from a technical standpoint for the use indicated herein. This Release does not purport to establish a comparative quality or value rating for this product as compared to standard products normally used in the same manner.

This Materials Release cannot be used as an indication of endorsement, approval or acceptance by HUD of the described product, and any statement or representation, however made, indicating such approval, endorsement or acceptance by HUD is unauthorized. See Code 18, U.S.C. 709.

Any reproduction of this Release must be in its entirety.

USE: Exterior Stucco and Insulation System.

DESCRIPTION:

The Ultrakote exterior insulation system consists of a 3/8" thick, mill-mixed acrylic modified cement stucco applied to woven wire mesh over polyurethane or polyisocyanurate insulation boards and includes the caulks and sealants.

GENERAL CONDITIONS:

The Ultrakote system shall be designed and installed in accordance with Ultrakote Products, Inc, (Ultrakote) specifications and details except where modified by this Materials Release (MR). The system shall be installed by an applicator who is approved by Ultrakote. Ultrakote shall be responsible for certifying that the installed polystyrene insulation board is in compliance with this MR. Ultrakote shall maintain a current list of approved sealant systems which are compatible with the Ultrakote system and process, and shall certify that the sealant is in compliance with the Ultrakote sealant requirements. The Ultrakote system shall be in compliance with Table 1.

Field quality control shall be the responsibility of Ultrakote. Field inspections shall be performed by an Ultrakote technical representative at the beginning of each project. The Ultrakote inspector shall verify the soundness of the structural substrate for acceptance of the Ultrakote system. All joints shall be designed and constructed on the assumption that a leak can occur in the primary seal. A secondary seal or other defense against leaks shall be provided together with a built-in means of dispensing any water.

MILL-MIXED ULTRAKOTE:

Shall consist of a factory blended mix of portland cement, hydrated lime, 1/2" chopped alkali-resistant fiber glass and acrylic polymer in a 80 lb. moisture-resistant bag. Sand and water are added at site.

LIMITATIONS:

Ultrakote Stucco shall not be applied over open studs. No additives shall be added to the mill-mix in the field. Once mixed, the stucco shall not be tempered.

INSTALLATIONS:

Installation shall be in compliance with Ultrakote specifications, HUD Minimum Property Standards (MPS) and all conditions of this Materials Release (MR).

1. Prior to installation of the stucco systems, the building shall be checked for solid nailing of studs, appropriate blocking and structural bracing.
2. Sheathing is a part of the Ultrakote system and shall not be used as a nail base. All fasteners holding wire reinforcement shall be attached to wall studs.
3. Lath shall be installed in compliance with ASTM C-1063 and shall be inspected prior to applications of the Ultrakote modified cement plaster.
4. Ultrakote shall be delivered to the job site in original sealed bags with labels intact and legible. Labels shall be printed with the manufacturer's name and address, mixing instructions and quality control batch number.

5. Horizontal expansion joints are required at each story level. Install control joints to create panels relatively square, not larger than 144 square feet, and with no dimension exceeding 18 feet or a length to width ratio of 2-1/2:1. Different spacing may be required for specific job conditions, as determining by the design professional and Ultrakote.

NOTE; Control joints should be used at all surface penetrations, i.e. windows, doors, etc. and at areas of structural stress.

6. Do not mix or apply Ultrakote plaster when ambient temperature is less than 40°F. During hot, windy or dry weather the applied Ultrakote plaster must be protected from uneven and excessive evaporation.
7. All joints and intersections with dissimilar materials shall be protected from moisture intrusion. Provide for drainage behind the exterior stucco in compliance with Section A 2.2 of Appendix to ASTM C-926, Application of portland cement-based plaster.
8. Each installation shall have a card left at the site for the owner and a copy on file with the HUD Field Office. The card shall contain the name and address of the applicator, date of application and a copy of the Ultrakote warranty applicable to this MR.
9. Water resistant building paper (or felt) shall be placed over wood or wood-based sheathing, the wire mesh shall be applied over the paper. Lath and paper shall be lapped at the ends and sides for uninterrupted coverage of the sheathed wall that is to receive the Ultrakote stucco.

CERTIFICATION:

Note: Applicators must be qualified in the workmanship of plastering and must be able to show completed work of equal scope.

Applicators shall be trained and licensed by Ultrakote. Ultrakote shall furnish each trained applicator with a certificate stating that the applicator is trained and qualified to preform the work of installing the Ultrakote stucco system. Ultrakote shall provide the local HUD Office, the owner and the builder with a list of certified applicators upon request. A copy of all certifications required by this MR shall be provided to the owner and the local HUD Office by Ultrakote.

TABLE 1

Materials Requirements	Values	Test Method
Fiber cement board	compliance	ASTM C-1186
Gypsum Sheathing core treated	Compliance Section 3.2	ASTM C-79
Metal Lath	compliance 1" 20 ga.	FED SPEC. QQ-L-101C
Polystyrene foam board insulation Density, Min. Thickness, Max. Flammability, Max.	Compliance Type 1, Grade 2 1.5 lbs./cu.ft. 4 inch 25 flame spread	ASTM C-578 ASTM C-578 ASTM C-578 ASTM E-84
Sand	Free of salts, organic matter & deleterious materials. Compliance	ASTM C-897
Caulks & Sealants Min.	Types S Grade NS 20 year warranty	ASTM C-920
Mechanical Fasteners Min.	Compliance	UM 25d, Fed.Spec.FF-N-105B ASTM C-514 & C-846 (Sect.4.2.4.3, & 4.4)
Portland Cement	Type 1, 11-1 or 11	ASTM C-150
Finish pigments	UV stable 2000 hrs	ASTM G-23
Coating Thickness	3/8" minimum	ASTM C-150
Wind loading	no damage @ 50 psi.	ASTM E-330
Surface impact	no damage with 30 lb weight @ 6 ft	ASTM E-695
Flammability, Max.	6 ft. flame height	ASTM E-108
Fungus resistance	No growth	MIL 810B
Wind driven rain	No water break	MIL TTC555B
Freeze-thaw	No cracks 60 cycles	ZIMA test †
Building paper	Water-resistant Compliance	Federal Spec. UU-B-790a, Type 1 Grade C
Compressive Strength, average of three consecutive tests	1500 psi @ 7 days 2500 psi @ 28 days	ASTM C-109 (modified)‡
Flexural Strength average of three consecutive tests	500 psi @ 7 days and 650 psi @ 28 days	ASTM C-348 (modified)‡
Polyurethane Board, min. density 1-1/2 pcf max. thickness 4"	Type 1, 2 or 3	ASTM C-591

†EIMA TEST REQUIREMENT:

Three samples 4" x 8" x 1" are paraffin wax coated on the edges and the back and immersed in 25° centigrade water and then subject to 60 cycles of freeze-thaw with each cycle 2 hours at -18° Centigrade and 2 hours at 25° Centigrade. Inspect the samples for cracks.

‡STRENGTH TEST MODIFICATION:

Modified to use sand in compliance with ASTM C-897 and with mix proportions specified by UltraKote in compliance with this Materials Release.

MANUFACTURER'S WARRANTY:

Ultrakote warrants the Ultrakote Stucco System for twenty (20) years from the date of the initial application to be free from any defects which seriously affect the weather-resistant of the system. Should any defects occur, Ultrakote shall make a pro rata allowance for replacements or pay the owner the amount of the allowance. Ultrakote shall not be liable for damages or defects resulting from misuse, natural catastrophes, casualties or other causes beyond the control of Ultrakote.

This warranty does not relieve the builder, in any way, of responsibility under the terms of the builder's warranty required by the National Housing Act, or under any provisions applicable to any other housing program.

MANUFACTURER'S RESPONSIBILITIES:

Issuance of this Materials Release (MR) commits the manufacturer to fulfill, as a minimum, the following:

1. Produce, label and certify the material, product or system in strict accordance with the terms of this MR.
2. Provide necessary corrective action in a timely manner for all cases of justified complaint, poor performance or failure reported by HUD.
3. When requested, provide the Office of Consumer and Regulatory Affairs, Manufactured Housing and Standards Division HUD Headquarters, with a representative list of properties, in which the material, product or system has been used, including complete addresses or descriptions of locations and dates of installation.
4. Inform HUD in advance of changes in production facilities, methods, design of the product, company name, ownership or mailing address.

EVALUATION:

This MR shall be valid for a period of three years from the date of initial issuance or most recent renewal or revision, whichever is later. The holder of this MR shall apply for a renewal or revision 90 days prior to the Review Date printed on this MR. Submittals for renewal or revision shall be sent to HUD Headquarters. Appropriate user fees shall be sent to:

U. S. Department of Housing and Urban Development
Technical Suitability of Products Fees
P. O. Box 954199
St. Louis, MO 63195-4199

The holder of this MR may apply for revision at any time prior to the Review Date. The revision may be in the form of a supplement to the MR.

If the Department determines that a proposed renewal or supplement constitutes a revision, the appropriate User Fee for a revision will need to be submitted in accordance with Code of Federal Regulations 24 CFR 200.934, "User Fee System for the Technical Suitability of Products Program," and current User Fee Schedule.

CANCELLATION:

Failure to apply for a renewal or revision shall constitute a basis for cancellation of the MR. HUD will notify the manufacturer that the MR may be canceled when:

1. conditions under which the document was issued have changed so as to affect production of, or to compromise the integrity of the accepted material, product, or system,
2. the manufacturer has changed its organizational form without notifying HUD, or
3. the manufacturer has not complied with responsibilities it assumed as a condition of HUD's acceptance.

However, before cancellation, HUD will give the manufacturer a written notice of the specific reasons for cancellation, and the opportunity to present views on why the MR should not be canceled. No refund of fees will be made on a canceled document.

This Materials Release is issued solely for the captioned firm,
and is not transferable to any person or successor entity.
